DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES Office of Structural Materials Quality Assurance and Source Inspection

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Contract #: 04-0120F4

Cty: SF/ALA Rte: 80 PM: 13.2/13.9

File #: 69.28

WELDING INSPECTION REPORT

Resident Engineer: Pursell, Gary **Report No:** WIR-009742 Address: 333 Burma Road **Date Inspected:** 10-Oct-2009

City: Oakland, CA 94607

OSM Arrival Time: 700 **Project Name:** SAS Superstructure **OSM Departure Time:** 1900 **Prime Contractor:** American Bridge/Fluor Enterprises, a JV

Contractor: Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China

CWI Name: Xu Yumin **CWI Present:** Yes No **Inspected CWI report:** Yes N/A **Rod Oven in Use:** Yes No No N/A N/A **Electrode to specification:** Yes No Weld Procedures Followed: Yes No N/A N/A **Qualified Welders:** Yes No **Verified Joint Fit-up:** Yes No N/A N/A Yes N/A **Approved Drawings:** Yes No **Approved WPS:** No Yes No N/A **Delayed / Cancelled:**

34-0006 **Bridge No: Component: OBG Segments**

Summary of Items Observed:

On this date Caltrans OSM Quality Assurance (QA) Inspector, Dan Hernandez was present during the times noted above to observe the fit up, welding and related activities associated with the fabrication of the San Francisco Oakland Bay Self Anchored Suspension Bridge at Zhenhua Port Machinery Company (ZPMC) facility on Changxing Island.

OBG Trial Assembly Yard

Segment 1AAW/1AW

This QA Inspector observed Shielded Metal Arc Welding (SMAW) in progress of a Complete Joint Penetration (CJP) weld joint. The Weld joint is designated as OBW1-001, root pass. The welder is identified as #049769 and was observed welding in the 1G (flat) position using approved Welding Procedure Specification WPS-345-SMAW-1G (1F)-repair-1 for CWR829 UT repair at Y location 660mm thru 6600mm from cross beam Edge Plate.

This QA Inspector observed Submerged Arc Welding (SAW) in progress of a Complete Joint Penetration (CJP) weld joint. The Weld joint is designated as OBW1-001, fill and cover pass. The welder is identified as #046830 and was observed welding in the 1G (flat) position using approved Welding Procedure Specification WPS-345-SAW-1G-repair-1 for CWR829 UT repair at Y location 660mm thru 6600mm from cross beam Edge Plate.

WELDING INSPECTION REPORT

(Continued Page 2 of 3)

Segment 1AW/1BW

This QA Inspector observed Shielded Metal Arc Welding (SMAW) in progress of a Complete Joint Penetration (CJP) weld joint. The Weld joint is designated as OBW1A-007. The welder is identified as #048659 and was observed welding in the 3G (vertical) position using approved Welding Procedure Specification WPS-345-SMAW-3G (3F)-repair-1, for WR831 UT repair at Y location 2115mm from counter weight Side Plate.

Segment 5AW/5BW

This QA Inspector observed excavations of UT indications in the segment CJP splice at the following Y locations, Side Plate interior- 70mm, 1112mm, 3250mm, 4960mm from counter weight side Bottom plate, exterior- 3000mm, 3320mm, 5400mm, 5730mm, 5950mm from counter weight side Bottom plate. Bottom Plate interior- 3720mm, 5420mm, 7820mm, and 8043mm from cross beam side Edge Plate. Segment 5BE/5CE

This QA Inspector observed grinding in progress at the location of removed backing bar from Deck Plate segment CJP splice.

Segment 1AW

This QA Inspector observed grinding of cope holes of the floor beam at Bottom Plate connection at panel point 9.5 cross beam side.

Segment 1AE/1BE

This QA Inspector observed ABF personnel performing UT on the segment CJP splice along the Bottom Plate, Deck Plate and Side Plate cross beam side. D scan was performed.

ZPMC Quality Control (QC) Inspector is identified as Feng Ya Jun and Wang Li Yang. QA Inspector observed QC Inspector verify welding parameters. The welding variables recorded by QC appeared to comply with the Applicable WPS.

Unless otherwise noted, all work observed on this date appeared to generally comply with applicable contract documents.

Summary of Conversations:

No relevant conversations.

Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang, 150-0042-2372, who represents the Office of Structural Materials for your project.

WELDING INSPECTION REPORT

(Continued Page 3 of 3)

Inspected By:	Hernandez, Dan	Quality Assurance Inspector
Reviewed By:	Carreon, Albert	QA Reviewer